TANGILOVA, K. F.

USSR/Chemical Technology. Chemical Froducts and Their I-9

Application - Silicates Glass, Ceramics, Binders.

Abs Jour : Referat Zhur - Khimiya, No 4, 1957, 12656

Author : Royak S.M., Myshlyayeva V.V., Tandilova K.B.

Inst : All-Union State Scientific Research Institute of Cement

Industry

Title : Sulfate Stability of Cements with Active Additions of

Volcanic Origin

Orig Pub : Tr. Gos. vses. n.-i. in-ta tsement. prom-sti, 1956,

No 9, 82-108

Abstract : A study was made of the correlations between sulfate sta-

bility of puzzuolanic Portland cements (P) containing acid and basic additions of volcanic origin, and the nature of the additions and their conteat in alumina. Confirmed was the correlation between amount of extraneous admixtures, content of soluble alumina and activity of CaO absorption, in the case of tuffs. With increase in

Card 1/3 - 108 -

USSR/Chemical Technology. Coemical Products and Their I-9
Application - Silicates. Glass. Ceramics. Binders.

Abs Jour : Referat Zhur - Khimiya, No 4, 1957, 12656

extraneous admixtures and activity of additions as to CaO absorption, the content of soluble alumina increases. Additions of volcanic origin that are of a basic type did not exhibit such regularities. Studied were the processes of corrosion in 1 and 5% solutions of Na₂SO_h (I) of P containing C₃A 13.6; 8.4 and 3.1% and of puzzuolanic P. Hardening of cements in 1% solution of I involves the formation of Ca sulfoaluminate (II), the amount of which depends on the C₃A content of the clinker, and the extent of participation of the alumina of the addition in the formation of II. Hardening of cements in 5% solution of I involves, in addition, a crystallization of gypsum. Its amount in the case of P is 17-25% CaSO_h after 6 months of hardening, and in the case of puzzuolanic P depends on activity and amount of additions, attaining up to 20% CaSO_h: Investigation of the kinetics of the

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Card 2/3

- 109 -

USSR/Chemical Technology, Chemical Products and Their I-9
Application - Silicates, Glass, Ceramics, Binders,

Abs Jour : Referat Zhur - Khimiya, No 4, 1957, 12656

processes of corrosion of puzzuolanic P, based on determination of the amount of combined and free gypsum, has revealed that only 1-1.5% of the Al₂O₃ of the addition take part in the formation of II during the process of hardening over a period of 6 months. Formation of II in puzzuolanic P due to C₂A of the clinker, as well as due to the alumina of the addition, has a detrimental effect on sulfate stability of puzzuolanic P, if the ratio of CaO (mg) to the content of soluble Al₂O₃ (%) is < 10-15. Amount of extraneous additions, in the case of trasses and tuffs must be > 6%. It is necessary to render more precise the technical specifications for active additions of volcanic origin in the production of sulfate-stable puzzuolanic P.

Card 3/3

- 110 -

TANDILOVA, K.B.; BRODSKIY, V.A.

Wall bricks made with dolomite lime. Stroi.mat. 5 no.12:27-28

D '59. (MIRA 13:3)

(Bricks) (Lime)

KUTATELADZE, K.S., doktor tekhn.nauk, prof.; TANDILOVA, K.B., kand.tekhn.

Investigating technological parameters and sands used in producing cement-sand roofing tiles. Stroi. mat. 6 no.7:33-35 Jl '60. (MIRA 13:7)

(Tiles, Reofing) (Sand--Testing)

KUTATELADZE, K. S., prof., doktor tekhn.nauk; TANDILOVA, K. B., kand.tekhn.nauk; SAVINSKIY, P. P., inzh.; YENUKIDZE, N. Ye., inzh.

Quick hardening slag portland coment from the Rustavi coment plant.
Nauch. soob. NIITSementa no.11:12-17:14. (MIRA 15:2)

1. Nauchno-issledovatel skiy institut promstroymaterialov sovnarkhoza Gruzinskoy SSR i Rustavskiy tsementnyy zavod. (Rustavi-Cement)

KUTATELADZE, K.S., doktor tekhn.nauk; TANDILOVA, K.B., and tekhn.nauk; SOSELIYA, L.D., inzh.; DZHADZHANASHVILI, 0.5., inzh.; CHRDILELI, 0.G., inzh.

Increasing the activity of clinkers. TSement 30 no. 2:7-8 Mr-Ap '64. (MIRA 17:5)

l. Gosudarstvennyy nauchno-issledovatel'skiy institut stroitel'-nykh materialov, Tbilisi, i Rustavskiy tsementnyy zavod.

83260

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S/109/60/005/009/005/026 E140/E455

AUTHORS :

Tandit, V.L. and Tartakovskiy, L.B.

TITLE:

Radiation of a Reflector Antenna in the Shadow Zone

PERIODICAL: Radiotekhnika i elektronika, 1960, Vol.5, No.9,

pp. 1398-1406

The article is based on the current method of calculating reflector antenna radiations. The reflector is assumed to be ideally conducting and infinitely thin, with a low-directivity radiator. The radiator dimensions are assumed comparable with the wavelength and small in comparison with the The analysis takes into account diffraction reflector dimensions. correction for the radiator near field, curvature of the reflector and edge effect, discussed in Ref. 3. The radiation of the reflector antenna in the shadow zone is determined by the screening effect of the finite metal reflector and depends little It is defined 1) by the field on the directivity of the antenna. of the radiator and the character of the radiating points on the reflector boundary; 2) by the distance from the stationary point of the reflector to the radiating point on the boundary and 3) by the presence of the edge effect at the sharp edge of the Card 1/2

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S/109/60/005/009/005/026 E140/E455

Radiation of a Reflector Antenna in the Shadow Zone

When the reflector boundary is intensely irradiated, the shadow zone field, calculated without considering diffraction current, can be made more exact by taking into account the edge effect. Regardless of the distribution of radiation from the primary radiator, at the reflector the back radiation can be changed only by several decibels in one direction or the other. The shape of the reflector boundary has an effect independent of the distribution of radiation at the reflector. The variation of the phase along the boundary can only decrease the observed field in the shadow zone by not more than half an order of magnitude. If the primary field at the reflector boundary is decreased to zero, it will only decrease the field in the shadow zone by an order of magnitude, and the near field of the primary radiator becomes decisive. This prevents further reduction of the shadow field by establishment of a zero of radiation from the primary radiator in the direction of the reflector boundary. There are 4 figures and 7 references: 6 Soviet and 1 English. SUBMITTED: January 7, 1960

Card 2/2

VASIL'TSOV, V.D.; VOLCHENKO, M.Ya.; GERTSOVICH, G.B., kand.ekon. nauk; ZHARKOV, Ye.I.; KONOVALOV, Ye.A., kand. ekon. nauk; MATVIYEVSKAYA, E.D.; OLEYNIK, I.P., kand. ekon. nauk; RAYEVSKAYA, E.S.,; SKVORTSOVA, A.I.; SOKOLOVA, N.V.; SOTNIKOVA, I.A.; TANDIT, V.S.; TRIGUBENKO, M.Ye.; FIRSOVA, Yu.V.; SHABUNINA, V.I.; YUMII., M.N.; STOROZHEV, V.I., kand. istor. nauk, red.; LEPNIKOVA, Ye., red.; SHIRNOV, G., tekhn. red.

[Economy of the people's democracies in figures for 1960] Ekonomika stran sotsialisticheskogo lageria v tsifrakh 1960 g. Pod red. G.B.Gertsovicha, I.P.Oleinika, V.I.Storozheva. Moskva, izdvo sotsial'no-ekon. lit-ry, 1961. 238 p. (MIRA 15:4) (Communist countries—Economic conditions)

TANDIT, W., kand. nauk ekon.

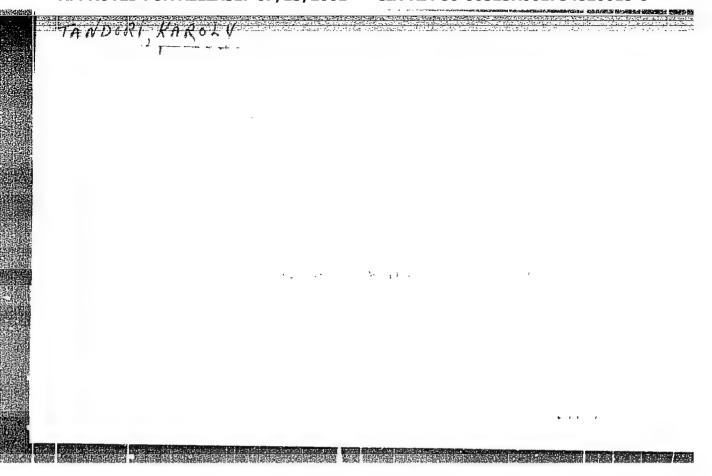
Common efforts as a guaranty for great development in chemistry. Przegl t chn 86 no.15:4 ll Ap 165.

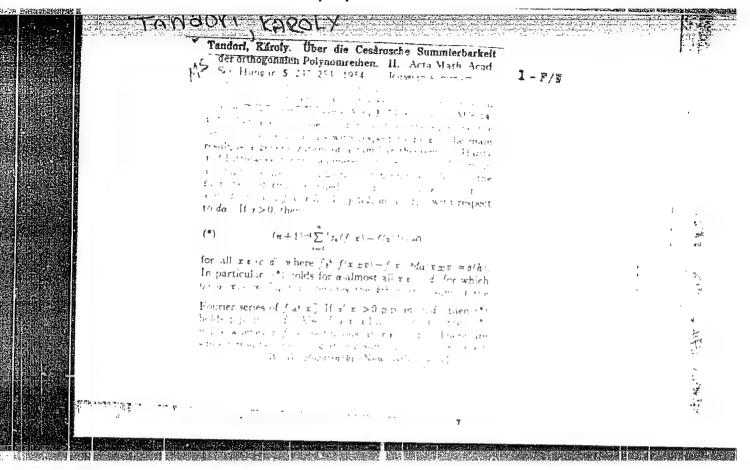
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	ACC NR: AP6016917 (A) SOURCE CODE: UR/0104/66/000/002/0005/0008	
	AUTHOR: Bukreyev, B. A. (Engineer); Tandler, M. M. (Engineer); Yakovlev, N. A	1
	(Managineer), Uvdrov, D. N. (Candidate of technical aciences). Hepopolise, A. N.	•
	(Candidate of technical sciences)	1
	ORG: none	
	TITLE: Electric generating stations with AI-20 gas turbines	1
	SOURCE: Elektricheskiye stantsii, no. 2, 1966, 5-8	
	TOPIC TAGS: gas turbine, turboprop engine, electric power plant, power grantless ABSTRACT: In 1964, plans and blueprints were developed by the Giprolestrans Planning Institute of stationary, quick-assembled, and transportable AI-20 turbopropengine-driven electric power plants. Such a 50-cps, 6.3-kv plant is to have a capacity of 1250, 1600, 2000, or 4000 kw. Sketches of the stationary and transportable plants are about 150 km.	
	portable plants are shown. Estimates show that such a plant will be economical if it is operated as a peak-load station, up to 3000-4000 hrs per year, and particularly if it uses a partly worn-out airplane engine. Orig. art. has: 4 figures and 1 table.	
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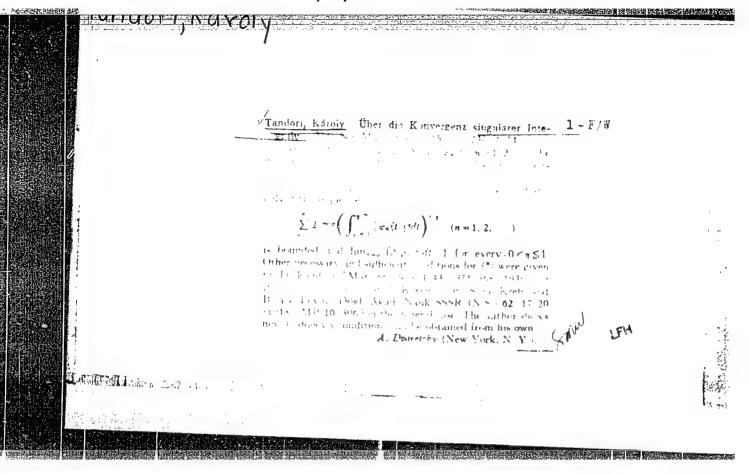
COUNTRY : GDR CATEGORY : Zooparasitology.Parasitic Worms.General Problems ABS. JOUR. : RZhBiol., No. 4 1959, No. 14986 : Aundon, R.3 AUTHOR INST. TIME : Life History of Gastrothylax crumenifer (Creplin, ORTG. PUB. : Z. wiss. Zool., 1957, 160, No.1-2, 39-71 : The life cycle of Gastrothylax crumenifer, a para-ABSTRACT site of the rumen of ruminants, widespread in India, has been studied experimentally. Depending on the conditions of light and temperature, the development of the miracidium takes 8-9 days. The hatching of miracidia occurs in the morning and the duration of their free-swimming life is six hours. As an intermediate host serves the molluse CARD: 1/3

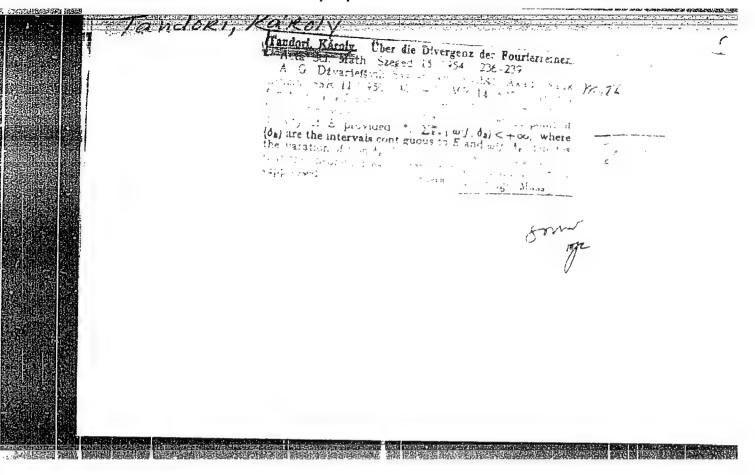
COUNTRY G CATEGORY APS. JOUR. RZhBiol., No. L 1959, No. 14986 AUTHOR 1 INST. \$ TITIE . ORIG. PUB. ARSTRACT : Gyraulus convexiusculus. The miracidia penetrate cont'd through the foot, head and muntle of the mollusc and in the mantle-cavity or in the mantle wall transform into the sporocysts inside which on the lith day rediae are formed. The lifetime of a sporocyst is 25 days. There is only one generation of rediee. On the Alitay cercariae develop within rediae, leaving them in an immature state and for a certain time parasitize in a mollusc liver. Their free life does not exceed 110 min. 2/3 CARD:

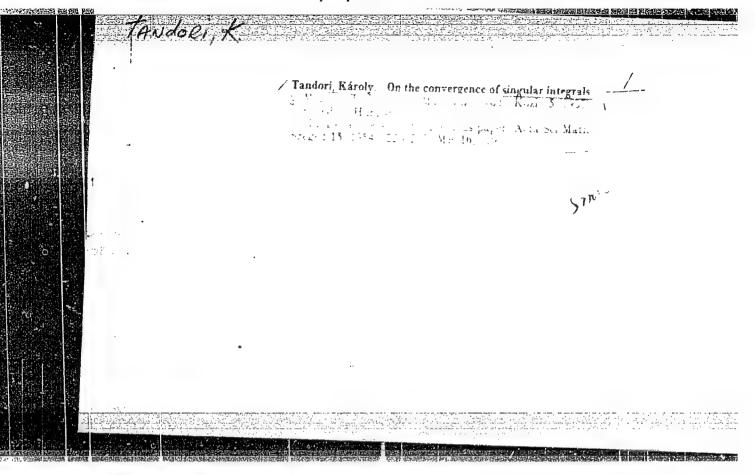
4 COUPTRY CATECORY ABS. JOUR. : RZhBiol., No. 4 1959, No. 14986 AUTHOR IMST. TITLE ORIG. PUB. : ABSTRACT : after which they encyst on the algae or aquarium contid walls. Sexually-mature worms were obtained within 9 months following the feeding of metacercariae to a young goat, Capra indica. The morphology of all the stages of development of the parasite is described in detail. Bibliography: 33 titles. -- T.A. Ginetsinskaya 3/3 CAFLD: 10









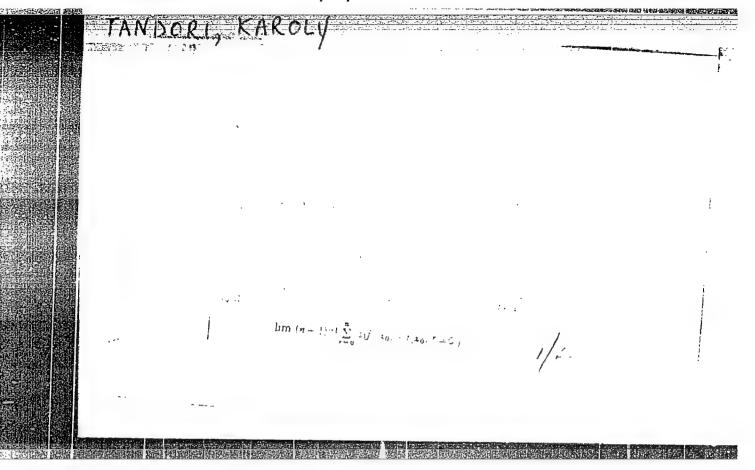


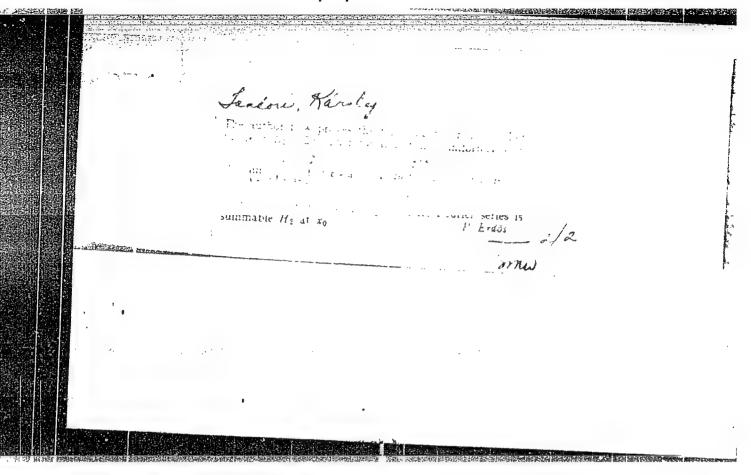
TANDORI, K.

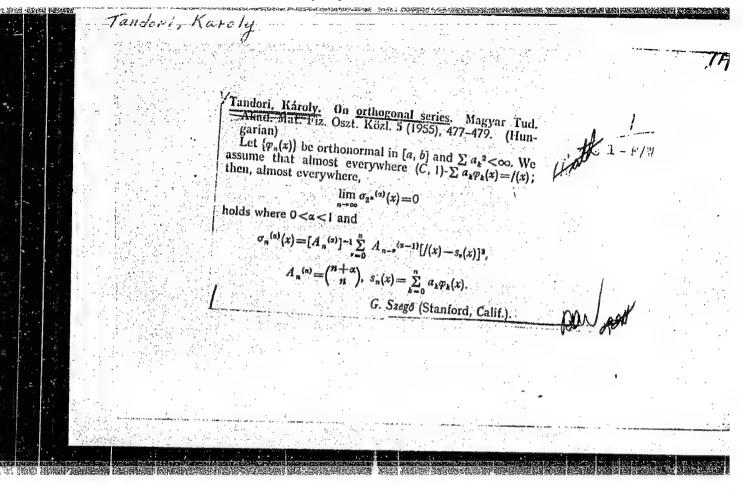
TANDORI, K. - Kozlemenyei- Vol. 5, no. 1, 1955.

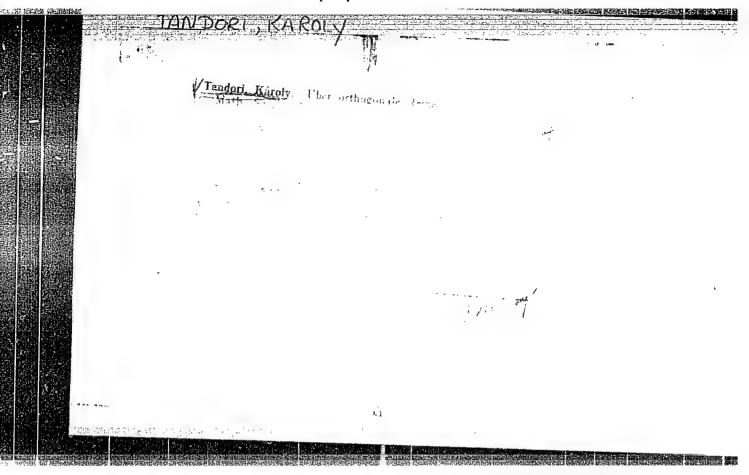
Public discussion of the dissertation by Gesa Fodor, candidate in mathematics.
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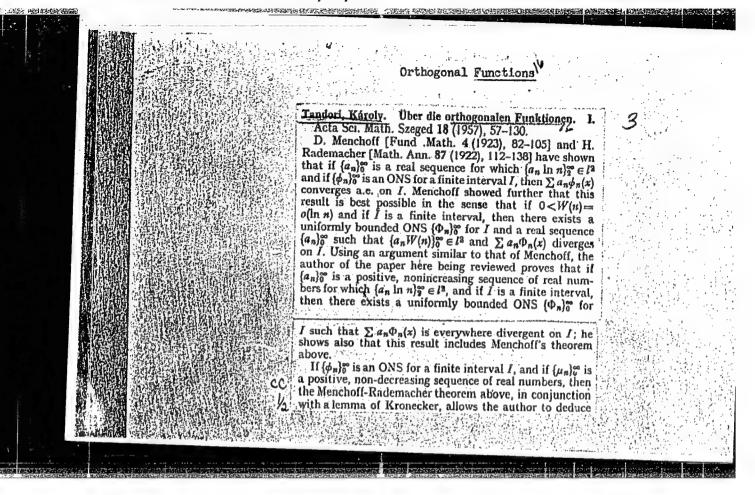
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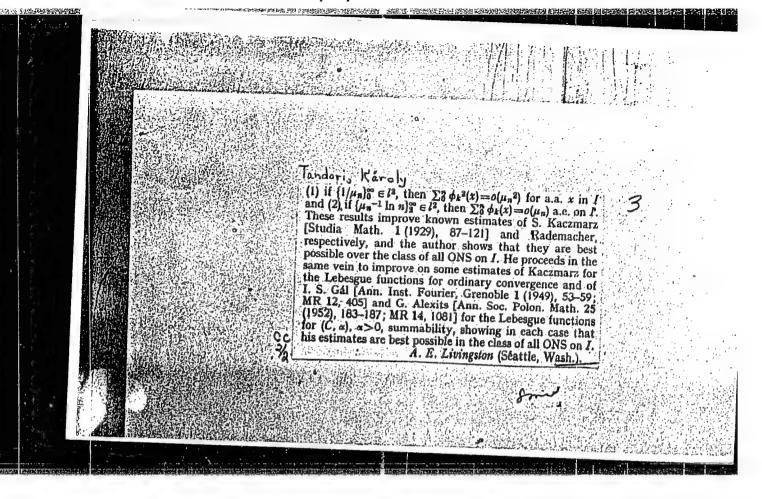
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p. 397 (Magyar Tudomanyos Akademia. Matematikai es Fizikai Osztoly. Fozlemcyei. Vol. 7, no. 3/h 1957. Eudapest, Hungary).

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Trudy Sib.avt.-dor.inst. no.6:73-94 157. (MIRA 12:2)

(Automobiles-Engines)

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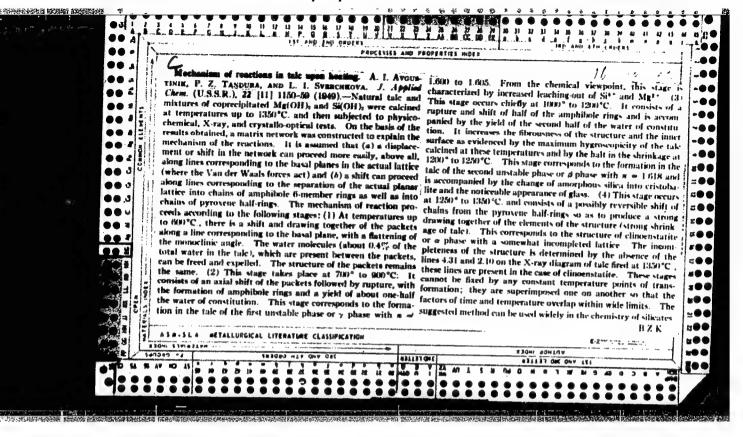
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1. Sibirskiy avtomobil'no-dorozhnyy institut.
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THE STREET STREE

TANDURA, I., kand.tekhn.nauk; EYDEL SCN, G., kand.tekhn.nauk

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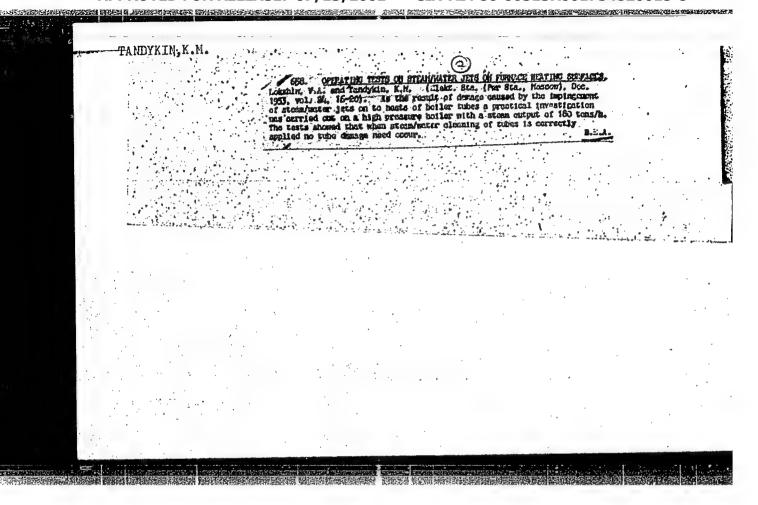
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(CEREBRAL CORTEX)

(NUTRITION)



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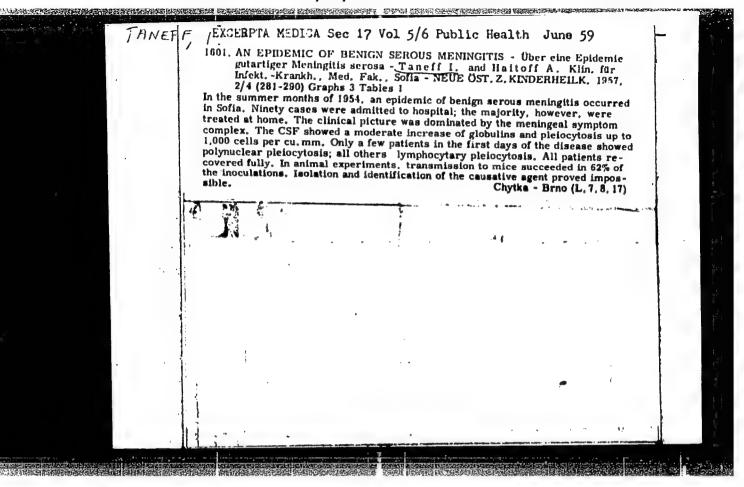
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protein determ., electrophoresis, diag. value)



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(Metallurgical furnaces)

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Combining of trades in an integrated brigade. Na stroi. Ros. no.7:18 J1 '61. (MIRA 14:8)

1. Kompleksnaya brigada otdelochnikov UNR-749 tresta Khabarovskstroy. (Khabarovsk--Finishes and finishing)

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PHASE I BOOK EXPLOITATION 474

- Kartsev, M.A., Aleksandridi, T.M., Knyazev, V.D., Tanetov, G.I., Legezo, L.S., Lavrenyuk, Yu.A., Shchurov, A.I., Brusentsov, N.P., Kuznetzova, V.P.
- Bystrodeystvuyushchaya vychislitel'naya mashina M-2 (High-speed Computer M-2) Moscow, Gostekhizdat, 1957. 228 p. 10,000 copies printed.
- Ed. (title page): Bruk, Isaak Semenovich, Corresponding Member, USSR Academy of Sciences; Ed. (inside book): Bezborodov, Yu. M.; Tech. Ed.: Gavrilov, S.S.
- PURPOSE: The book is written for engineers and students of vuzes, specializing in computer techniques, and for specialists interested in computer applications.
- COVERAGE: The book describes the M-2,a small-dimensioned, universal, high-speed digital computer developed by the Laboratory of Control Machines and Systems of the Academy of Sciences, USSR. A detailed description is given of the basic computer units: the arithmetic Card 1/13

High-speed Computer M-2

474

unit, internal memory devices, control devices and output devices. This description is supplemented with an exposition of the guiding principles of computer design, the binary system, coding and programming, and the design of basic components of the system. This makes the book accessible to readers who have no special training in electronic computers. The basic characteristics of the computer are as follows: the calculation system is binary; the code presentation is with a floating and fixed binary point; the number of binary digits is 34; the computation accuracy, with a floating binary point, is about eight decimal bits, and with a fixed binary point, about ten decimal bits (computations with doubled accuracy are also possible); the range of numbers in operations with a floating binary point is from 231 to 2-32; the coding system is a three-address code; operations performed are: addition, subtraction, multiplication, division, congruence with modulus, algebraic congruence, logical (signed) multiplication, sign inversion, transfer of numbers, and auxiliary operations (30 in all); the average speed of operation is

Card 2/13

High-speed Computer M-2

474

2000 operations per second. Of the internal memory devices the basic one is electrostatic, consisting of cathode-ray tubes of the 13L037 type, for 512 numbers; the access time is 25 #sec; the auxiliary consists of a magnetic drum for 512 numbers; the speed of rotation is 2860 rpm. The external memory device consists of a magnetic tape with a capacity of 50,000 numbers; its length is 600 m and speed 0.4 m/sec. The data is fed in on perforated paper tape at the rate of about 30 numbers per sec. The decoding of data is in tabular form, the printing speed is 24 numbers per min. The power supply is from a 3-phase a-c metwprl 127/220-v, the power intake is 29 kw. The area covered by the computer is 22 sq. m. The total number of tubes is 1879, of which 1676 are used in the computer itself and 203 in the power supply. The types and numbers of tubes used in every unit are given in Appendix 2. The personnel consists of two people per shift. The cost of building the computer was about one million rubles, and the cost of 24-hr operation is 16,000 to 18,000 rubles per month. The various stages of development of the M-2 involved

THE REPORT OF THE PROPERTY OF

Card 3/13

High-speed Computer M-2

474

the following engineers: M.A. Kartsev, V.V. Belinskiy and A.B. Zalkind, who developed the arithmetic unit; the electrostatic memory device was developed by T.M.Aleksandridi and Yu.A. Lavrenyuk; control devices by L.S. Legezo, V.D. Knyazev and G.I. Tanetov; magnetic memory devices by A.I. Shchurov and L.S. Legezo; input and output devices by A.B. Zalkind; the power supply system by V.V. Belynskiy, Y.A. Lavrenyuk and V.D. Knyazev; the control panel by V.V. Belynskiy and A.I. Shchurov. The design work was supervised by M.A. Kartsev. The following laboratory constructors, technicians, mechanics and assemblymen also worked on the project; I.Z. Gclifgat, A.D. Grechushkin, N.A. Nemtsev, F.F. Rzheutskiy, I.K. Shvil'pe, D.U. Yermochenkov, L.I. Fedorov, and G.I. Korostylev. The following persons collaborated in the writing of the book: M.A. Kartsev (Chapters I to VI and XI), I.M. Aleksandridi (Chapter VII), V.D. Knyazev (Chapters II, III, VII and IX), V.P. Kuznetsova (Chapter XII), Yu. A. Lavrenyuk (Chapters V and VII), G.I. Tanetov (Chapters VI, IX and XIII), A.I. Shchurov (Chapter VIII), N.P. Brusentsov (Chapters VIII, IX, XIV) and L.S. Legezo (Chapter X).

Card 4/13

High-speed Computer M-2	474
There are no references.	
TABLE OF CONTENTS:	
Foreword	6
Basic features of the M-2	8
Ch. I. General Information on the Computer	9
 Block-diagram of the M-2 The process of solving problems on the M-2 Presentation of numbers 	9 11 14
Ch. II. Basic Units of the Computer	23
1. The artithmetic unit	23
Card 5/13	

High-speed Computer M-2 474	
 Memory devices Programming data unit Input and output devices 	25 27 29
Ch. III. Programming System	31
 Program and instructions Operations performed by the M-2 Example of programming Additional observations concerning the use of the management of the second secon	31 33 42
magnetic drum	44
Ch. IV. Performing Operations with Numbers	45
A. Forced-point Operations	
1. Addition and subtraction	46
Card 6/13	

2. 3.	Multiplication Division		50 51
	B. Logical Operations		
4. 5. 6.	Algebraic congruence Congruence with modulus Logical [signed] multiplication		54 56 56
	B. Floating-point Opera	tions	
7. 8. 9.	Addition and subtraction Multiplication Division		57 66 69
•			75
ard	7/13		

High-speed Computer M-2 474	
Ch. V. Circuit Components	75
 Triggers and pulse counters Logical circuits Valves Blocking-oscillators; Kipp-relay 	75 78 80 84
Ch. VI. Arithmetic Unit	85
1. General description 2. Block diagram of the mantissa medium digit 3. Extreme mantissa digits 4. Order digits and zero digit of the arithmetic unit 5. Pulse shaping unit	85 94 100 104 107
Ch. VII. Electrostatic Memory Device	110
1. Physical principles of "memorizing"	110
Card 8/ 13	

High-sp	eed Computer M-2 474	
elect 3. A 4. G	perating conditions and block-diagram of the rostatic memory device mplifier and regeneration unit ate unit canning units	114 116 120 123 126
Ch. VII	I. Magnetic Drum Memory Device	127
2. S writi 3. W	eneral characteristics and principle of operation tructure of the magnetic drum and of the heads fing and reading rite-read diagrams	or 130 132
	haping the markers and the black-out pulse of the counter	135
Ch. IX.	Programming Data Unit	136
Card 9/	713	

1. Principle of operation 2. Functions of the programming data units 3. Cycles of the pulse distributor 4. Structure of the pulse distributor 5. Operation selection unit 6. Starting and synchronization unit 7. Program register unit 8. Memory selection unit 9. Arithmetic operations unit Ch. X. External Magnetic Tape Memory Device 1. General characteristics 2. Magnetic sound recorder and channel-separation	136 137 138 143 146 149 152 155 157 180
2. Magnetic sound recorder and one	184
3. Control circuit	
Card 10/13	

High-speed Computer M-2 474	
Ch. XI. Input Equipment	189
 General features Block diagram and operating principle of input equipment 	189
	193
Ch. XII. Output Equipment 1. General features	198
2. Block diagram and operating principle of output equipment	198
Ch. XIII. Electric Power Supply	198
1. Electric motor unit	505
2. Rectifiers and stabilizers ard 11/13	202 203

High-speed Computer M-2 474	
3. Filament transformers	211
Ch. XIV. Assembly of the Machine	212
 General arrangement of blocks and units Cooling system Blocks and sub-blocks Electrical connections 	212 214 214 215
Appendix 1. List of Symbols Appendix 2. Quantity and types of tubes used Appendix 3. Controlling voltages and pulses fed into the arithmetic unit	217 219
Appendix 4. Controlling voltages generated by the arithmetic unit to the AD block of the programming data unit	223

Card 12/13

High-speed Computer M-2

474

Appendix 5. Time-segmential diagrams explaining the performance of operations with numbers

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Card 13/13

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AUTHORS: Avaliani, Yu. Ye., Alekseyev, Yu. N., Glukhov, Yu. N., Dorokhova, N. A., Tanetov, G. I.

TITLE: The arithmetic equipment of a specialized machine.

SOURCE: Akademiya nauk SSSR: Institut elektronnykh upravlyayushchikh mashin.
Tsifrovaya tekhnika i vychislitel'nyye ustroystva. no.3. 1962, 14-23.

TEXT: The paper describes an arithmetic equipment (AE) of the parallelitype, which operates with 22-digit binary numbers with a fixed decimal point and which performs addition, subtraction, multiplication, division, extraction of the square root, matching, shifting, and transposition of numbers. An acceleration in the multiplicational operations is achieved by the accumulation of the partial products without transitional carry-overs. The system of the elements and the design principles of the AE are briefly examined. The system of elements comprises a static trigger, a potential-impulse gate, and logic diode circuits. All of the elements are made up of semiconductor devices. The network of the AE is presented in skeletal form, which comprises the various equipments that serve to perform the elementary operations in each register, and the equipments that receive numbers from other partial parts of the machine. The operational algorithms of addition, subtraction,

Card 1/3

The arithmetic equipment of a specialized machine. \$\frac{5}{779}/62/000/003/002/008}

and division, and the technical methods in the design of the logical circuits which help to realize the algorithms, are similar to those employed in some existing computers, for example, the M-2. Thus, for example, the adding equipment of the AE differs in its logic structure from that employed in the M-2 machine only by the content of cyclic carry-over circuit from the higher digit to the lower digit. While the operation of algebraic matching exhibits certain peculiarities dependent on the character of the problems to be solved, there is nothing interesting from the point of view of engineering. In this operation, the same circuits as those utilized in addition and subtraction are employed. The operation of shifting is also of no additional interest, since it employs the same shifting circuitry employed in multiplication and division. In the multiplication the partial products remain immobile, whereas the multiplicand is shifted to the right. It can be shown that to obtain, in such procedure, an accuracy of no less than a unit of the lowest digit for 22-digit initial figures, it is necessary to have 3 additional digits in the AE prior to rounding off. Extraction of the square root follows almost precisely the same method as that employed in high-school long-hand work, that is, with division of the number into pairs of digits, extraction of the square root of the highest digital pair, and all the other subsequent steps required by the 2-rectangles-cum-small-square method, until the remainder is either zero or smaller than the required accuracy residual. The duration of the extraction of the square root amounts to 112 cadences or 317 u sec.

Card 2/3

The arithmetic equipment of a specialized machine.

S/779/62/000/003/002/008

If the number of which the square root is to be obtained has a minus sign, then all the digits go to zero, and the operation comes to a halt. The description of the AE elements comprises the static trigger, the logical diode scheme, and the potential impulse gate, schematic circuits for all of which are shown. A block diagramis shown for a basic (k-th) digit of the AE. The AE described contains approximately 1,000 semiconductor triodes and 4,000 semiconductor diodes, all of which operate in regimes in which current intensities, voltages, and powers do not exceed the rated values. A special cooling system ensures maintenance of all semiconductor devices at room temperature. The circuits employed ensure maintenance of a stable operation of the AE under power-supply-voltage fluctuations of ±10% from nominal values. The electrical power supply of the AEsis provided by a 400-cps rotary generator through rectifiers assembled in a 6-phase circuit. The total power requirements of the AE is approximately 0.8 kw. The AE is currently in experimental operation. There are 5 figures and 3 references (2 Russian-language Soviet and the English-language A.A.Robinson, Multiplication in the Manchester University high-speed digital computer. Electronic Engrg., v.25, no.299, 1953).

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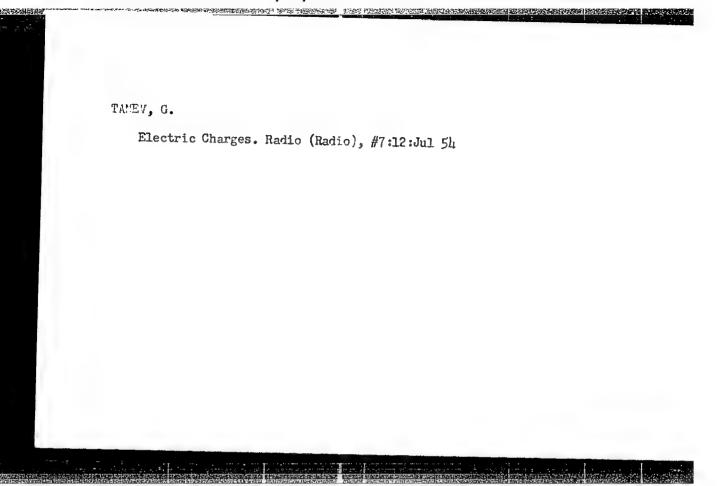
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